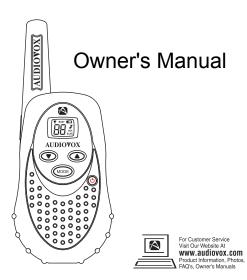
# **General Mobile Radio Service (GMRS)** Model: GMRS120/120-2



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# **CAUTIONS**

AVOID PLACING THE GMRS120/120-2 RADIO TRANSCEIVER FOR PROLONGED PERIODS OF TIME IN DIRECT SUNLIGHT OR TEMPERATURES BELOW -4° F (-20° C) OR ABOVE 140 ° F (60° C).

KEEP THE ANTENNA AT 1 INCH (2.5 cm) AWAY FROM YOUR HEAD AND BODY. DO NOT USE YOUR GMRS120/120-2 RADIO TRANSCEIVER WITH A DAMAGED ANTENNA.

#### **GMRS LICENSE:**

USE OF THIS RADIO WITHIN THE UNITED STATES REQUIRES AN FCC GMRS LICENSE. AN INDIVIDUAL18 YEARS OF AGE OR OLDER, WHO IS NOT A REPRESENTATAIVE OF A FOREIGN GOVERNMENT, IS ELIGIBLE TO APPLY FOR A GMRS SYSTEM LICENSE. YOU WILL NEED TWO FORMS FROM THE FCC: FCC FORM 159 AND FCC FORM 605 MAIN FORM AND SCHEDULE F. YOU CAN FIND THE FORMS ONLINE AT: HTTP://WWW.FCC.GOV/ FORMPAGE.HTML. OR CALL 1-800-418-3676.

### Model GMRS120/120-2 (FCC License Required)



- 1. Battery Cover
- 2. Detachable Carry Clip
- 3. Push-To-Talk (PTT) and Function Confirmation Button
- 4. Antenna
- 5. Built-in Microphone
- 6. Power On/Off and
  - SCAN Button

- 7. Built-in Speaker
- 8. Liquid Crystal Display (LCD)
- 9. MODE/ VOX Button
- 10. Up Channel/Volume Button
- 11. Down Channel/Volume
  - Button

### Model GMRS120/120-2 DISPLAY



- **1.BUSY Indicator:** The icon appears when the unit is receiving
- 2.Transmit Indicator: Icon appears when the unit is in the transmit mode (PTT button activated or VOX mode active).
- 3.Large Segment Display: Indicates the channel number in use.
- **4.Battery Level Indicator:** Icon appers when the battery charge is
- 5.RogerBeep Tone On/Off Indicator: This icon appears when Roger Beep tone is on, and disappears when tone is not in use.
- 6. Voice Activated Transmission(VOX) Indicator: This function allows hands free conversation. The icon appears when the VOX
- 7.Scan Indicator: This function allows the user to scan a channel every 5 second to search for a valid signal

#### **Equipment and Accessories Supplied**

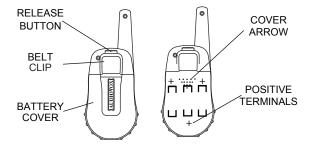
1. Radio (1) **GMRS120** 2. Radio (2) GMRS120-2 Owner's Manual (1) 128-6680

#### Powering the transceiver:

Your GMRS120/120-2 radio transceiver operates on three AAA Alkaline batteries. Alkaline batteries wil provide slightly better performance than rechargeable batteries.

### Installing the batteries:

Press down with the thumb at the embossed arrow, slide the battery cover down and lift off the battery cover. Insert four AAA batteries (alternate positive ends (+) toward the top of the transceiver, starting left-to-right.



- press down on battery cover at arrow and slide cover down to
- down and then lift cover at bottom to open.Remove cover.
- 1. Using thumb, 2. Slide the cover 3. Insert three AAA batteries (positive (+) end toward the top begining at left side and alternating positive terminals as shown).

### Push To Talk (PTT) Button (3)

Pressing and holding this button will allow you to speak to any transceiver that is set to the same channel setting as yours. Hold the transceiver approximately 1 to 2 inches from your face as you speak into the built in microphone (5).

After you have finished speaking, release the PTT Button to allow reception of incoming signals. It is not possible to transmit and receive at the same time. While the PTT Button is pressed and the TX indicator on the LCD will appear.be display. Releasing the button allows the unit to revert to standby mode. When receiving an incoming signal, the BUSY icon will appear. The PTT Button can also be used as a two-way call ringer. Pressing the button twice quickly will call another party on the same channel. The Transmit icon on the LCD will displayed for 3 seconds and then go out.

#### Up Channel/Volume Button (10)

In the standby mode, pressing this button will increment the listening volume. When in function edit mode this button will be used to adjust the unit's settings.

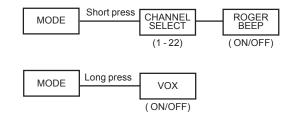
### Down Channel/Volume Button (11)

In the standby mode, pressing this button will decrement the listening volume. When in function edit mode this button will be used to adjust the unit's settings.

#### MODE Button (9)

Press this momentarily to select various feature settings in the GMRS and FRS modes. Press and hold this button to enable or disable the VOX function.

### **GMRS120/120-2 OPERATIONAL MODES**



### NOTE:

Refer to the appropriate section of this manual for detailed operating instructions for each mode.

#### Controls:

#### Power On/Off and SCAN (6) Button

Press and hold the power on/off button ( (1) ) for at least 2 seconds. You will hear a confirming melody to indicate the unit is on. To turn the unit off, press and hold the button for at least 2 seconds.

Press this Button momentarily to enable or disable the scan mode.

#### Adjusting the Volume (10, 11)

With the unit powered on, press the Up Channel/Volume button ( ) to increase volume and the Down Channel/Volume button ( ▼ ) to decrease volume. The display will indicate the current volume level by the icon ( UL 0-7 ).

### **Operating Modes and Features**

### **GRMS/FRS Operation**

- Press and hold the power button for 2 seconds to turn on power.
- Press the MODE button so the Channel number flashes.
- Select the desired channel with the Up(10) and Down(11) Buttons. When receiving a call, the BUSY icon on the LCD appears to indicate incoming received signal.
- Press and hold the PTT button (3) to transmit, then speak into the microphone clearly and slowly.
- Release PTT Button (3) to receive.
- Communication can only be accomplished when the channel and CTCSS tone frequency of at least two parties are the same.

#### **Channel Selection**

In order to communicate with other GMRS/FRS units, both transmitting and receiving party must be on the same frequency. The GMRS120/120-2 has 22 channels (frequencies) (1-22) indicated by the large digits on the LCD display panel. Channels 1 through 7 are the shared GMRS/FRS channels. Channels 8-14 are FRS only channels, while channels 15-22 are assigned GMRS only channels.

Communication with Audiovox GMRS/FRS and compatible units is possible on these 22 channels.

### To change the channel,

- From GMRS/FRS standby mode, press the MODE button (9) until the channel number flashes.
- Press the Up Button (10) briefly to move to the next higher main channel number
- Press the Down Button (11) briefly to move to the next lower main channel number.

#### **VOX Selection Mode**

This option enables you to have hands-free conversation. Your voice or nearby sound is detected and the radio transmits without the need to press the PTT button.

#### To set radio for VOX operation,

-From GMRS/FRS standby mode, press and hold the MODE button until the VOX icon appears on the display.

VOX can be turned off by pressing the MODE button for 3 seconds.

#### Channel Scan Operation

This feature allows you to monitor all channels automatically for valid signals. While scanning, you can transmit and receive. When a signal is received, the scan is interrupted and will return to scan mode 5 seconds after reception is terminated.

#### NOTE:

While the scan function is active the MODE button will be inoperative. The scan mode will reduce the overall battery life due to the battery save function is overridden.

#### To enable the channel scan mode,

- From GMRS/FRS standby mode.momentarily press the power Button; (SCAN) will appear on the LCD display.
- The radio will display each channel (1-22) in order as the scan mode operates to find an active main channel.
- When unit doesn't find any signals and you want to transmit, press the PTT switch to return to home channel operation. The transceiver will automatically resume scanning approximately 5 seconds after the communication is completed.
- If there is no activity and you want to leave the scan mode, press the power button momentarily and the unit will return to normal operation; (SCAN) icon will disappear from the LCD display.

#### **Key Tone**

This feature allows the transceiver to sound a confirmation tone whenever the following keys are pressed: Up/Down button, MODE button, SCAN button. The key tone is always on.

#### Roger Beep Tone

The Roger Beep is a tone which is automatically transmitted whenever the PTT button is released. This tone alerts the receiving party that the transmission has been terminated intentionally. To enable and disable the Roger Beep tone:

- From GMRS/FRS standby mode, press the Function Button until the flashing Roger Beep icon appears with On or oF.
- Press the Up or Down Button to select the tone on or off as desired. - When enabled, the tone icon ( \( \( \) \) appears steady on the display.
- Press the PTT to confirm selection.

#### **Battery Alert**

When the battery icon ( blinks on/off at 7 second intervals, as shown on the LCD panel, recharge or install fresh batteries.

#### NOTES FOR GOOD COMMUNICATION

- 1.The GMRS120/120-2 22 channels are shared on a 'take turns' basis. This means other groups may be talking on any of the channels. A common code of ethics/courtesy is to switch to another vacant channel and not to attempt to talk over someone who is already using the channel you first selected.
- 2.The GMRS120/120-2 has been designed to maximize performance and improve transmission range in the field. To avoid interference, it is recommended that you do not use the units closer than 5 feet apart.
- 3. For best transmission results, always keep your mouth about 2-3 inches from the microphone (5) and speak slowly in a normal voice.
- 4. To increase battery life, avoid features such as Scan. These features will reduce operating time considerably.

### Warning

- Do not operate the transceiver unless you are licensed to do so.
- Remove the batteries from the transceiver if it is not expected to be used for long periods. This will eliminate the possibility of chemicals leaking from the batteries and corroding the transceiver.
- Avoid exposing the transceiver to water or extremes of temperature.
- · Do not use this device in or near a mining facility, which uses remotely triggered explosives or in areas labeled "Blasting Area". Premature or accidental detonation may result.
- Do not attempt to modify or in any way increase the output of this transceiver. Its output is designed to meet the legal limits set by the FCC.
- Do not use this device or change its batteries in potentially explosive atmospheres as sparks in such areas could result
- Turn your transceiver off wherever posted notices restrict the use of radios or cellular telephones. Facilities such as hospitals may use equipment that is sensitive to RF energy.

Turn your transceiver off on board aircraft when requested to do so. Do not place your radio in front of a vehicle's air-bag. If the air-bag deploys, it could propel the transceiver like a projectile causing bodily injury.

## **Troubleshooting**

Problem	Possible cause	Correction	
No transmission	Weak batteries	Charge or replace batteries	
while pressing the PTT Button	Incorrect battery polarity	Install the batteries following the directions in paragraph Installing the Batteries.	
Weak or no	Weak batteries	Charge or replace batteries	
signal received	Channel and privacy code not set the same as target transceiver	Adjust the transceiver's settings to match those settings of the target transceiver	
	Volume level too low PTT Button inadvertently depressed	Increase volume level Release PTT Button	
	Excessive radio interference on a particular channel Obstruction of radio signal	Change to a different channel Avoid operating in or near large buildings or vehicles	
Unit beeps, but will not function when turned on	Batteries extremely discharged	Charge or replace batteries	
Reception of unwanted signals	Interference from electronic device such as computers or TVs	Turn the devices off or move farther away from them.	

### **TechnicalSpecifications**

#### General

Frequency Range:

Channels 1 through 7 are Refer to frequency chart on next page. shared with FRS radios.

Channels 8 through 14 are Refer to frequency chart on next page. FRS only.

Channels 15 through 22 are Refer to frequency chart on next page. GMRS only.

Channel Spacing 12.5kHz

Dimensions (W x H x D) 1.73 W x 3.3 H x 1.10 D

(Without Antenna) (44.0 mm x 84.0 mm x 28.0 mm)

### **PowerSupply**

Power Source Alkaline Batteries, AAA (3), 4.5 VDC

Operating Time 30 hours Low Power

(Transmit: Receive: Standby = 5: 5: 90 ratio)

#### Receiver

>-119 dBm Useable Sensitivity

Maximum Audio Output Power > 0.25 Watt maximum (32 Ohm )

Modulation Distortion < 5% (1 kHz 70%)

#### **Transmitter**

RF Output Power 0.5 Watts maximum

Maximum Deviation +/- 2.5 kHz

Modulation Distortion < 5% (1 kHz 70%)

This transceiver complies with FCC regulations for use in the United States of America. Use in other countries may be prohibited or restricted by local regulation. Please check with the local regulating agency before using this device outside the United States of America.

# Main Channel Frequencies

	CHANNEL /TYPE	FREQ(MHz) /PWR		CHANNEL /TYPE	FREQ(MHz) /PWR
1	GMRS/FRS	462.5625	12	FRS	467.6625
2	GMRS/FRS	462.5875	13	FRS	467.6875
3	GMRS/FRS	462.6125	14	FRS	467.7125
4	GMRS/FRS	462.6375	15	GMRS	462.5500
5	GMRS/FRS	462.6625	16	GMRS	462.5750
6	GMRS/FRS	462.6875	17	GMRS	462.6000
7	GMRS/FRS	462.7125	18	GMRS	462.6250
8	FRS	467.5625	19	GMRS	462.6500
9	FRS	467.5875	20	GMRS	462.6750
10	FRS	467.6125	21	GMRS	462.7000
11	FRS	467.6375	22	GMRS	462.7250

NOTE: Channels 1 through 7 are shared with FRS radios.

Channels 8 through 14 are FRS only.

Channels 15 throung 22 are GMRS only.

#### 90 DAY LIMITED WARRANTY

Applies to Audiovox Family Radio and General Mobile Service Products.

AUDIOVOX CORPORATION (the Company) warrants to the original retail purchaser of this product that should this product or any part thereof, under normal use and conditions, be proven defective in material or workmanship within 90 days from the date of original purchase, such defect(s) will be repaired or replaced with new or reconditioned product (at the Company's option) without charge for parts and repair labor.

To obtain repair or replacement within the terms of this Warranty, the product is to be delivered with proof of warranty coverage (e.g. dated bill of sale), specification of defect(s), transportation prepaid, to the warranty center at the address shown below.

The Company disclaims liability for communications range of this product

This Warranty does not apply to any product or part thereof which, in the opinion of the Company, has suffered or been damaged through alteration, improper installation, mishan dling, misuse, neglect, accident, or by removal or defacement of the factory serial number bar code label(s). THE EXTENT OF THE COMPANY'S LIABILITY UNDER THIS WARRANTY IS LIMITED TO THE REPAIR OR REPLACEMENT PROVIDED ABOVE AND IN NO EVENT SHALL THE COMPANY'S LIABILITY EXCEED THE PURCHASE PRICE PAID BY PURCHASER FOR THE PRODUCT

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